

5 WHAT IS CLAIMED IS:

1. A method for treatment of neurodegenerative conditions and effects of aging, including autoimmune conditions and fibromyalgia, said method comprising the steps of:

administering to a patient a compound effective for increasing neuronal metabolism of histamine to a histamine H2 agonist, in an amount sufficient that said histamine H2 agonist is produced in an amount adequate to stimulate production of cyclic AMP at a level which maintains myelin against undergoing self-degeneration.

2. The method of claim 1, further comprising the step of:

selecting said compound from the group consisting of:

histamine N-methyltransferase;
monamine oxidase A;
monoamine oxidase-A agonists;
monoamine oxidase-B inhibitors;
histamine H3 antagonists; and
iron chelating agents.

3. The method of claim 2, wherein said compound is histamine N-methyltransferase, and wherein the step of administering said compound comprises:

administering histamine N-methyltransferase to said patient so as to increase neuronal metabolism of histamine to tele-methylhistamine.

4. The method of claim 3, wherein the step of administering histamine N-methyltransferase comprises:

administering isolated histamine N-methyltransferase by injection.

5. The method of claim 2, wherein said compound is monoamine oxidase-A, and wherein the step of administering said compound comprises:

administering monoamine oxidase-A to said patient so as to increase neuronal metabolism of tele-methylhistamine to 4-methylhistamine.

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6. The method of claim 2, wherein said compound is a monoamine oxidase-B inhibitor, and wherein the step of administering said compound comprises:

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administering said monoamine oxidase-B inhibitor to said patient so as to increase the activity ratio of monoamine oxidase-A to monoamine oxidase-B and thereby increase neuronal metabolism of tele-methylhistamine to 4-methylhistamine.

7. The method of claim 6, wherein said monoamine oxidase-B inhibitor is selegiline hydrochloride.

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8. The method of claim 2, wherein the compound is a histamine H3 antagonist, and wherein the step of administering said compound comprises:

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administering said histamine H3 antagonist to said patient so as to inhibit neuronal metabolism of tele-methylhistamine to R-alpha-methylhistamine and thereby increase neuronal metabolism of tele-methylhistamine to 4-methylhistamine.

9. The method of claim 8, wherein said histamine H3 antagonist is thioperamide maleate.

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10. The method of claim 2, wherein said compound is an iron chelating agent, and wherein the step of administering the compound comprises:

administering said iron chelating agent to said patient so as to reduce the presence of a predetermined iron constituent and thereby reduce peroxidation-induced inhibition of neuronal metabolism of histamine to tele-methylhistamine.

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11. The method of claim 10, wherein said iron chelating agent is deferoxamine mesylate.

12. The method of claim 11, wherein the step of administering said iron chelating agent comprises:

5 administering said deferoxamine mesylate in the range from about 500 mg-1 g IM per day.

13. The method of claim 11, wherein the step of administering said iron chelating agent comprises:

10 administering said deferoxamine mesylate in the range from about 20-40 mg/kg S.C. per day.

14. The method of claim 2, wherein said compound is a monoamine oxidase-A agonist, and wherein the step of administering said compound comprises:

15 administering said monoamine oxidase-A agonist to said patient so as to increase neuronal metabolism of tele-methylhistamine to 4-methylhistamine.

15. The method of claim 15, wherein said monoamine oxidase-A agonist is reserpine.

16. The method of claim 16, wherein the step of administering said monoamine oxidase-A agonist comprises:

administering reserpine by slow-release transdermal dose.

17. The method of claim 16, wherein the step of administering said monoamine oxidase-A agonist comprises:

administering reserpine by injection in the range from about 1-10 mg/kg S.C. per day.